

CLAIMS**WE CLAIM:**

1. A method for controlling a communications system, comprising:
5 communicating using signals synchronized with a first synchronizing signal;
communicating using signals synchronized with the first synchronizing signal during a hand
off period; and
communicating using signals synchronized with a second synchronizing signal after the hand
off period.
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2. A method, as set forth in claim 1, wherein the first synchronizing signal is
delivered from a first base station to a mobile device.
3. A method, as set forth in claim 1, wherein the second synchronizing signal is
15 delivered from a second base station to a mobile device.
4. A method, as set forth in claim 1, further comprising receiving signals reflecting
parameters of communication between a mobile device and a second base station.
- 20 5. A method, as set forth in claim 4, wherein the hand off period is initiated in
response to the parameters of communication between the mobile device and the
second base station.

6. A method, as set forth in claim 4, wherein the second base station is added to an active set associated with the mobile device, wherein each base station in the active set is permitted to communicate with the mobile device.
- 5 7. A method, as set forth in claim 6, further comprising communicating the active set to the mobile device.
8. A method, as set forth in claim 1, further comprising receiving signals reflecting parameters of communication between a mobile device and a first base station.
- 10 9. A method, as set forth in claim 8, wherein the hand off period is terminated in response to the parameters of communication between the mobile device and the first base station.
- 15 10. A method, as set forth in claim 9, wherein the first base station is removed from an active set associated with the mobile device, wherein each base station in the active set is permitted to communicate with the mobile device.
- 20 11. A method, as set forth in claim 10, further comprising communicating the active set to the mobile device.
12. A method, as set forth in claim 1, wherein communicating using signals synchronized with the first synchronizing signal during the hand off period further comprises communicating from a first base station, a second base station and a

third base station to a mobile device using signals synchronized with the first synchronizing signal during a hand off period.

13. A method, as set forth in claim 12, wherein communicating from the second base station to the mobile device using signals synchronized with a second synchronizing signal after the hand off period further comprises communicating from the second base station to the mobile device using signals synchronized with the second synchronizing signal in response to communications with both the first and third base stations being ended.

14. A method, as set forth in claim 13, wherein communicating from the second base station to the mobile device using signals synchronized with the second synchronizing signal in response to communications with both the first and third base stations being ended further comprises communicating from the second base station to the mobile device using signals synchronized with the second synchronizing signal in response to communications with the first base station and then the third base station being ended.

15. A method, as set forth in claim 13, wherein communicating from the second base station to the mobile device using signals synchronized with the second synchronizing signal in response to communications with both the first and third base stations being ended further comprises communicating from the second base station to the mobile device using signals synchronized with the second

synchronizing signal in response to communications with the third base station and then the first base station being ended.

16. A method, as set forth in claim 1, further comprising a second base station retaining in memory the first synchronizing signal.

17. A method for controlling a mobile device, comprising:
communicating using signals synchronized with a first synchronizing signal;
communicating using signals synchronized with the first synchronizing signal during a hand
off period; and
communicating using signals synchronized with a second synchronizing signal after the hand
off period.

18. A method, as set forth in claim 17, wherein the first synchronizing signal is received by a mobile device from a first base station.

19. A method, as set forth in claim 17, wherein the second synchronizing signal is received by a mobile device from a second base station.

20. A method, as set forth in claim 17, further comprising delivering signals reflecting parameters of communication between a mobile device and a second base station.

21. A method, as set forth in claim 20, wherein the hand off period is initiated in response to the parameters of communication between the mobile device and the

second base station and the mobile device receives a signal adding the second base station to an active set associated with the mobile device, wherein each base station in the active set is permitted to communicate with the mobile device.

- 5 22. A method, as set forth in claim 17, further comprising delivering signals reflecting parameters of communication between a mobile device and a first base station.
- 10 23. A method, as set forth in claim 22, wherein the hand off period is terminated in response to the parameters of communication between the mobile device and the first base station and the mobile device receives a signal removing the first base station from an active set associated with the mobile device, wherein each base station in the active set is permitted to communicate with the mobile device.
- 15 24. A method, as set forth in claim 17, wherein communicating to using signals synchronized with the first synchronizing signal during the hand off period further comprises communicating to a first base station, a second base station and a third base station using signals synchronized with the first synchronizing signal during a hand off period.
- 20 25. A method, as set forth in claim 24, wherein communicating to the second base station using signals synchronized with the second synchronizing signal after the hand off period further comprises communicating to the second base station using signals synchronized with the second synchronizing signal in response to communications with both the first and third base stations being ended.

26. A method, as set forth in claim 25, wherein communicating to the second base station using signals synchronized with the second synchronizing signal in response to communications with both the first and third base stations being ended
5 further comprises communicating to the second base station using signals synchronized with the second synchronizing signal in response to communications with the first base station and then the third base station being ended.

27. A method, as set forth in claim 24, wherein communicating to the second base station using signals synchronized with the second synchronizing signal in response to communications with both the first and third base stations being ended
10 further comprises communicating to the second base station using signals synchronized with the second synchronizing signal in response to communications with the third base station and then the first base station being ended.

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